



**Microsemi Corp.**

The diode experts

SCOTTSDALE, AZ

**1N4460 thru  
1N4496  
and  
1N6485 thru  
1N6491**



## FEATURES

- Microminiature package.
- High performance characteristics.
- Stable operation at temperatures to 200°C.
- Voidless hermetically sealed glass package.
- Triple layer passivation.
- Very low thermal impedance.
- Metallurgically bonded.
- JAN/S/TX/TXV Types available per MIL-S-19500/406.

## MAXIMUM RATINGS

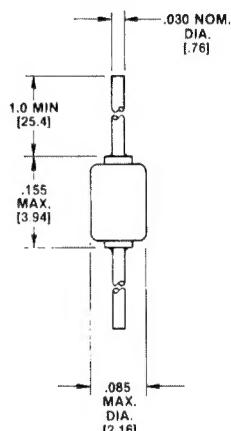
Operating Temperature: -65°C to +175°C.

Storage Temperature: -65°C to +200°C.

Power Dissipation: 1.5 Watts @ 30°C Air Ambient.

## ELECTRICAL CHARACTERISTICS @ 25°C

TYPE	ZENER VOLTAGE (NOM.) <i>V<sub>Z</sub></i>	TEST CURRENT <i>I<sub>ZT</sub></i>	DYNAMIC IMPEDANCE (MAX.) <i>Z<sub>ZT</sub></i>	KNEE IMPEDANCE (MAX.) <i>Z<sub>ZK</sub></i>	TEST CURRENT <i>I<sub>ZK</sub></i>	REVERSE CURRENT (MAX.) <i>I<sub>R</sub></i>	TEST VOLTAGE <i>V<sub>R</sub></i>	MAXIMUM RATINGS	MAXIMUM SURGE <i>I<sub>S</sub></i> @ 100°C	
	VOLTS	mA	OHMS	OHMS	mA	mA	VOLTS	mA		
1N4485	3.3	76.0	10	400	1.0	.50	1.0	433	-	4.2
1N4486	3.6	69.0	10	400	1.0	.50	1.0	397	-	3.9
1N4487	3.9	64.0	9	400	1.0	.35	1.0	366	-	3.6
1N4488	4.3	58.0	9	400	1.0	.50	1.0	332	-	3.3
1N4489	4.7	53.0	8	500	1.0	.40	1.0	304	-	3.0
1N4490	5.1	49.0	7	500	1.0	.10	1.0	280	-	2.7
1N4491	5.6	45.0	5	600	1.0	.05	2.0	255	-	2.5
1N4460	6.2	40.0	4	200	1.0	10.0	3.72	230	-	2.3
1N4461	6.8	37.0	2.5	200	1.0	5.0	4.08	210	5.0	2.1
1N4462	7.5	34.0	2.5	400	.5	1.0	4.50	191	4.5	1.9
1N4463	8.2	31.0	3	400	.5	.50	4.92	174	3.9	1.7
1N4464	9.1	28.0	4	500	.5	.30	5.46	157	3.4	1.6
1N4465	10.0	25.0	5	500	.25	.30	8.00	143	3.0	1.4
1N4466	11.0	23.0	6	550	.25	.30	8.80	130	2.6	1.3
1N4467	12.0	21.0	7	550	.25	.20	9.60	119	2.4	1.2
1N4468	13.0	19.0	8	550	.25	.05	10.40	110	2.2	1.1
1N4469	15.0	17.0	9	600	.25	.05	12.00	95	1.8	.95
1N4470	16.0	15.5	10	600	.25	.05	12.80	90	1.6	.80
1N4471	18.0	14.0	11	650	.25	.05	14.40	79	1.4	.79
1N4472	20.0	12.5	12	650	.25	.05	16.00	71	1.2	.71
1N4473	22.0	11.5	14	650	.25	.05	17.60	65	1.1	.65
1N4474	24.0	10.5	16	700	.25	.05	19.20	60	.90	.60
1N4475	27.0	9.5	18	700	.25	.05	21.60	53	.80	.53
1N4476	30.0	8.5	20	750	.25	.05	24.00	48	.75	.48
1N4477	33.0	7.5	25	800	.25	.05	26.40	43	.66	.43
1N4478	36.0	7.0	27	850	.25	.05	28.80	40	.60	.40
1N4479	39.0	6.5	30	900	.25	.05	31.2	37	.54	.37
1N4480	43.0	6.0	40	950	.25	.05	34.4	33	.48	.33
1N4481	47.0	5.5	50	1000	.25	.05	37.6	30	.45	.30
1N4482	51.0	5.0	60	1100	.25	.05	40.8	28	.42	.28
1N4483	56.0	4.5	70	1300	.25	.25	44.8	26	.39	.26
1N4484	62.0	4.0	80	1500	.25	.25	49.6	23	.35	.23
1N4485	68.0	3.7	100	1700	.25	.25	54.4	21	.32	.21
1N4486	75.0	3.3	130	2000	.25	.25	60.4	19	.29	.19
1N4487	82.0	3.0	160	2500	.25	.25	65.6	17	.26	.17
1N4488	91.0	2.8	200	3000	.25	.25	72.8	16	.23	.16
1N4489	100.0	2.5	250	3100	.25	.25	80.0	14	.20	.14
1N4490	110.0	2.0	300	4000	.25	.25	88.0	13	.19	.13
1N4491	120.0	2.0	400	4500	.25	.25	96.0	12	.18	.12
1N4492	130.0	1.9	500	5000	.25	.25	104.0	11	.16	.11
1N4493	150.0	1.7	700	6000	.25	.25	120.0	9.5	.14	.095
1N4494	160.0	1.6	1000	6500	.25	.25	128.0	8.9	.12	.089
1N4495	180.0	1.4	1300	7000	.25	.25	144.0	7.9	.10	.079
1N4496	200.0	1.2	1500	8000	.25	.25	160.0	7.2	.08	.072



## MECHANICAL CHARACTERISTICS

Case: Hermetically sealed glass case.

Lead Material: Tinned copper.

Marking: Body painted, alpha numeric with JEDEC number.

Polarity: Cathode band.

# 1N4460 thru 1N4496 and 1N6485 thru 1N6491

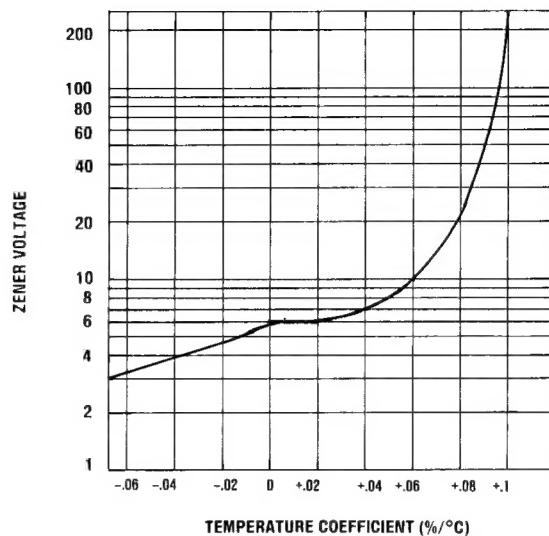


FIGURE 2  
TYPICAL TEMPERATURE  
COEFFICIENT CHARACTERISTICS

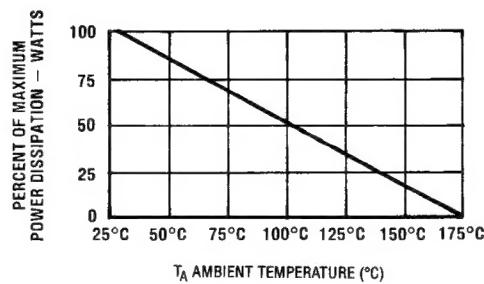


FIGURE 3  
POWER TEMPERATURE DERATING CURVE